

ABSTRACT OF THE DISCLOSURE

A mechanization of a fuel cell system and a method of operating the same is provided which simplifies the start-up of the fuel cell system. The fuel cell system can be started up without using any battery derived high voltage power to drive a high voltage compressor. The present invention provides for the use of a low voltage blower to provide oxygen to the cathode side of the fuel cell stack to enable start-up of the fuel cell stack without the initial use of a high voltage compressor. The low voltage blower can be powered by a low voltage power source and/or the voltage produced by the fuel cell stack.